

A METHOD FOR STABILIZATION OF PROTEINS USING NON-NATURAL AMINO ACIDS

5

ABSTRACT OF THE DISCLOSURE

10 The present invention provides a method for producing modified stable polypeptides introducing at least one non-natural amino acid into the hydrophobic region of the polypeptide. The thermal and chemical stability of such polypeptides is improved compared to those properties of its corresponding wild type proteins.

15 The invention further provides purified leucine zipper and coiled-coil proteins in which the leucine residues have been replaced with 5,5,5-trifluoroleucines, and the modified proteins so produced demonstrate increased thermal and chemical stability compared to their corresponding wild-type natural proteins.